

**Final Statement of Reasons
Primary Maximum Contaminant Level Revisions
Title 22, California Code of Regulations**

All suppliers of domestic water to the public are subject to regulations adopted by the U.S. Environmental Protection Agency (EPA) under the Safe Drinking Water Act (42 U.S.C. 300f et seq.) as well as by the California Department of Health Services (Department) under the California Safe Drinking Act (Sections 4040.1 and 116300-116750, Health and Safety Code [H&S Code]). California has been granted “primacy” for the enforcement of the Federal Act. In order to receive and maintain primacy, states must promulgate regulations that are no less stringent than the federal regulations.

In accordance with federal regulations, California requires public water systems to sample their sources and have the samples analyzed for inorganic and organic substances in order to determine compliance with drinking water standards, also known as maximum contaminant levels (MCLs). Primary MCLs are based on health protection, technical feasibility, and costs. The water supplier must notify the Department and the public when a primary MCL has been violated and take appropriate action.

Pursuant to section 116365(g) of the H&S Code, the Department is mandated to periodically review primary MCLs. Since a major criteria for determining whether a revision should be made relates to current knowledge about contaminant risk, the Department has proceeded to review the existing MCLs within the context of public health goals (updated risk assessments) as they have been completed. The Cal/EPA Office of Environmental Health Hazard Assessment (OEHHA) has now completed public health goals (PHGs) for a number of the existing MCL contaminants (see the OEHHA website: <http://www.oehha.ca.gov/water/phg/index.htm>). The OEHHA PHG documents most pertinent to this proposed regulation are those for cyanide, ethylbenzene, oxamyl, atrazine, methoxychlor, and 1,2,4-trichlorobenzene. The Department conducted an initial screening to determine whether any of these MCLs merited a more comprehensive review, using the following criteria:

- The relationship between the PHG and both the federal and state MCLs;
- Any changes in treatment techniques for chemical removal that would provide for a materially greater protection of public health; and
- Any new scientific evidence indicating that the substance might present a materially different risk to public health than was previously determined.

In two separate lists in 1998 and 1999, the Department designated a number of chemicals selected for a more comprehensive review by this initial screening: Cyanide, ethylbenzene, oxamyl, atrazine, methoxychlor, and 1,2,4-trichlorobenzene were among those selected because the PHGs were below the MCLs and the PHGs reflected changes in perceived risk to public health.

The Department used the "Procedure for Reviewing Maximum Contaminant Levels (MCLS) for Possible Revision" that was finalized in August 1999 (see attached) for its MCL reviews.

To assess chemical occurrence in drinking water sources for the MCL reviews, the most recent four years of analytical data were obtained from the Department's Water Quality Monitoring (WQM) database and analyzed for each chemical under review. The Department has established individual standardized reporting (quantification) levels called "detection levels for purposes of reporting" (DLRs) for the chemicals in WQM. The DLR represents the level at which the Department is confident about the accuracy of the quantity of contaminant being reported. The DLRs have been adopted into the regulations for chemicals with primary MCLs.

Review of the occurrence data for each of the chemicals listed above indicated that there were no detects above the PHGs, except one that was never confirmed. Several of the chemicals had no detects above the DLRs either (atrazine, methoxychlor and oxamyl). Thus, revising these MCLs would not result in any fiscal impact on water systems, but would provide greater health protection should detections occur in the future. Any future detections above MCL levels could be addressed by available and effective treatment technologies that are reasonable in cost. Therefore, the Department proposes to amend chapter 15, division 4, title 22 of the California Code of Regulations as follows:

- Table 64431-A would be amended to reduce the MCL for cyanide from 0.2 to 0.15 mg/L.
- Table 64444-A would be amended to reduce the MCLs for ethylbenzene and 1,2,4-trichlorobenzene from 0.7 and 0.07 mg/L to 0.3 and 0.005 mg/L, respectively, to provide greater health protection.
- Table 64444-A would be amended to reduce the MCLs for atrazine, methoxychlor, and oxamyl from 0.003, 0.04 and 0.2 mg/L to 0.001, 0.03, and 0.05 mg/L, respectively, to provide greater health protection.
- Table 64445.1-A would be amended to reduce the detection limit for reporting purposes (DLR) for atrazine from 0.001 mg/L to 0.0005 mg/L to provide for greater health protection by identification of contamination at lower levels.
- Sections 64468.1, 64468.2 and 64468.3, article 19, which contain the language used to notify the public when there are MCL violations, would be amended to update the MCL levels for each of the chemicals for which the MCL would be reduced.

The net effect would be that community and nontransient-noncommunity water systems would be required to comply with more stringent MCLs for cyanide, ethylbenzene, 1,2,4-trichlorobenzene, atrazine, methoxychlor, and oxamyl.

None of the proposed amendments would affect California's primacy status, because the net affect of these amendments is that the state's regulation would be more stringent than the federal, which is allowed.

In addition to the above amendments, the Health and Safety Code citations in the authority/reference NOTES for sections 64468.1, 64468.2, and 64468.3 would be amended for consistency with the relevant sections of the Health and Safety code as currently codified.

Pursuant to Section 100290 of the Health and Safety Code, both prior to and during the 45-day public comment period, the California Council of Local Health Officers was provided with the opportunity to comment on these proposed regulations, but chose to not do so.

Pursuant to Section 116365(h) of the Health and Safety Code, the Department noticed and held public hearings (September 6, 2000 in Sacramento and September 14, 2000 in Los Angeles) to provide an opportunity to comment prior to the proposal of these regulations. No comments opposed to the proposed regulations were received.

The following paragraphs describe and explain the proposed amendments.

Article 4. Primary Standards - Inorganic Chemicals

Section 64431. Maximum Contaminant Levels - Inorganic Chemicals

The purpose of this section is to list the inorganic chemicals for which primary maximum contaminant levels (MCLs) have been established to protect the health of consumers of drinking water served by community and nontransient-noncommunity water systems. The Department proposes to reduce the MCL for cyanide from the existing 0.2 mg/L to 0.15 mg/L.

Cyanide is an inorganic chemical that can enter drinking water sources from discharges from steel/metal, plastic or fertilizer factories.

In 1991, EPA adopted an MCL of 0.2 mg/L for cyanide. After OEHHA reviewed and concurred with the federal MCL, the Department adopted this MCL in 1994. In 1997, OEHHA completed a full risk assessment and adopted a PHG of 150 µg/L (0.150 mg/L) for cyanide, which is above the current DLR of 0.1 mg/L. The PHG is based on an absence of clinical and histopathological effects in laboratory animals. Effects are related to the inhibition of cellular respiration resulting in cellular hypoxia, to which the central nervous system and heart are particularly susceptible.

WQM data on detections in drinking water sources indicate only one source with a detection greater than the PHG; follow up on that result did not confirm the finding. Therefore, it appears that there would be no cost impact if the MCL were lowered to 0.15 mg/L, and there would be increased public health protection provided should there be any subsequent detects.

Article 5.5. Primary Standards -- Organic Chemicals

Section 64444. General Requirements

The purpose of this section is to list the organic chemicals for which primary maximum contaminant levels (MCLs) have been established to protect the health of consumers of drinking water served by community and nontransient-noncommunity water systems.

The Department proposes to reduce the following MCLs: ethylbenzene from 0.7 to 0.3 mg/L; 1,2,4-trichlorobenzene from 0.07 to 0.005 mg/L; atrazine from 0.003 mg/L to

0.001 mg/L; methoxychlor from 0.04 to 0.03 mg/L; and oxamyl from 0.2 to 0.05 mg/L. Details are provided below.

Ethylbenzene Ethylbenzene is a widely used industrial solvent that can enter drinking water sources through discharges from petroleum refineries or industrial chemical factories. The Department proposes to reduce the MCL from the existing 0.7 mg/L to 0.3 mg/L.

Ethylbenzene causes liver toxicity in laboratory animals. In 1989, the Department adopted an MCL of 0.68 mg/L for ethylbenzene, based on OEHHA's risk assessment. EPA adopted an MCL of 0.7 mg/L in 1991 that the Department subsequently adopted for conformance in 1994, since there was no significant difference in public health protection. In 1997, OEHHA updated its risk assessment and adopted a PHG of 300 µg/L (0.300 mg/L). The PHG contains an additional 10-fold uncertainty factor to take into account possible carcinogenicity.

WQM occurrence data for the last 4 years indicate 26 sampling sites with detections, with a maximum finding of 28 µg/L (0.028 mg/L). Given that none of the detections exceeds the PHG, there would be no cost impact from lowering the MCL to 0.3 mg/L and public health protection would be increased, should there be higher levels of ethylbenzene detections in the future.

1,2,4-Trichlorobenzene 1,2,4-Trichlorobenzene is an organic chemical that can enter drinking water sources from a variety of industrial activities. The Department proposes to reduce the MCL from the existing 0.7 mg/L to 0.005 mg/L.

1,2,4-Trichlorobenzene causes adrenal gland enlargement in laboratory animals. EPA adopted an MCL of 0.07 mg/L for 1,2,4-trichlorobenzene in 1992. After OEHHA reviewed and concurred with the federal standard, the Department adopted an MCL at the same level in 1994. In 1998, OEHHA completed a full assessment and adopted a PHG of 5 µg/L (0.005 mg/L). An additional 10-fold uncertainty factor was used in determining the PHG, to take into account the potential for carcinogenicity. The DLR is 0.0005 mg/L.

WQM occurrence data indicate that there were no 1,2,4-trichlorobenzene detections above the PHG and only four sampling sites with detections below the PHG. Consequently, a reduction in the MCL would have no apparent cost impact, but would increase public health protection for any subsequent detections.

Atrazine Atrazine is an organic chemical registered for use as a herbicide in California for nonselective weed control along highways and railroad rights-of-way, as well as selective season-long weed control in sorghum, corn and other crops. Other formulations are used as pre-emergent and early post-emergent herbicides for citrus groves, sorghum, and corn. The Department proposes to reduce the MCL from the existing level of 0.003 mg/L to 0.001 mg/L.

Atrazine causes cancer in laboratory animals and is considered to pose a cancer risk to people. The Department adopted an MCL of 0.003 mg/L in 1989, based on the risk assessment conducted by OEHHHA (then the Department of Health Services) at that time. In 1991, the U.S. Environmental Protection Agency (EPA) adopted an MCL at the same level. In 1998, OEHHHA updated its risk assessment and adopted a PHG of 0.15 µg/L (0.00015 mg/L). This PHG is below the current DLR of 0.001 mg/L.

According to WQM, there have been no reported detections of atrazine in any drinking water sources for the past four years. Whether a lower reporting level would have resulted in some reported detections cannot be known, but given the lack of detections, there would be no apparent cost impact from lowering the MCL to a level equivalent to the DLR of 0.001 mg/L. Doing so would provide greater protection to the public should there be any detections in the future. However, an MCL set at the DLR presents problems in that there is no warning of an impending MCL violation, any "official" detect is at the MCL, and compliance determinations (averaging of the initial and followup monitoring samples pursuant to the regulations) are awkward. Therefore, the feasibility of lowering the MCL for atrazine is contingent on the feasibility of lowering the DLR. The Department's Sanitation and Radiation Laboratory Branch conducted analytical work and consulted with an advisory group of commercial laboratories and determined that the atrazine DLR could be lowered to 0.0005 mg/L, without losing any confidence in the accuracy of reported results. A DLR of 0.0005 mg/L with an MCL of 0.001 mg/L would provide an adequate confidence range in reporting results, warning of the chemical's presence before its MCL is exceeded, and reasonable MCL compliance determinations.

Methoxychlor Methoxychlor is an insecticide used on fruits and alfalfa that can enter drinking water sources through runoff or leaching. The Department proposes to reduce the MCL from the existing level of 0.04 mg/L to 0.03 mg/L.

Health effects associated with methoxychlor are reproductive difficulties. In 1991 EPA adopted an MCL of 0.04 mg/L for methoxychlor. In 1994, after OEHHHA reviewed and concurred with the federal level, the Department revised its existing MCL of 0.1 mg/L adopted in 1977 to 0.04 mg/L. In 1998, OHHEA completed a full risk assessment and adopted a PHG of 30 µg/L (0.030 mg/L).

WQM occurrence data for the last four years indicate no detections greater than the DLR of 0.01 mg/L. Given the absence of detections, there would be no cost impact from lowering the MCL to the PHG of 0.03 mg/L, and there would be increased public health detection should a detect occur.

Oxamyl Oxamyl can enter drinking water sources through runoff and leaching of insecticides used on field crops, fruits, ornamentals and especially on apples, potatoes, and tomatoes. The Department proposes to reduce the MCL from the existing level of 0.2 mg/L to 0.05 mg/L.

EPA adopted an MCL of 0.2 mg/L for oxamyl in 1992. After OEHHA reviewed and concurred with the federal risk assessment, the Department adopted an MCL at the same level in 1994. In 1997, OEHHA completed a full risk assessment and adopted a PHG of 50 µg/L (0.05 mg/L) which is based on decreased body weight gain in chronically-exposed laboratory animals.

WQM occurrence data for the last four years indicate no detections greater than the DLR of 0.02 mg/L. Given the absence of detects, there would be no cost impact from lowering the MCL to 0.05 mg/L, but there would be increased public health protection should a detection occur.

Section 64445.1 Repeat Sampling

The purpose of this section is to define the levels of detection for reporting purposes (DLRs) for all chemicals with MCLs and to establish the monitoring and MCL compliance requirements.

Table 64445.1-A would be amended to revise the DLR for atrazine. The PHG of 0.15 µg/L (0.00015 mg/L) for atrazine is below the existing DLR of 0.001 mg/L. The Department is proposing to reduce the MCL for atrazine to 0.001 mg/L, but in order to provide for reasonable compliance monitoring, the DLR needs to be below the MCL. As mentioned above, the Department determined that the atrazine DLR could be lowered to 0.0005 mg/L, without losing any confidence in the accuracy of reported results. Therefore, the Department proposes to amend the atrazine DLR accordingly.

Article 19. Notification of the Department and Water Consumers

Section 64468.1. Health Effects Language - Inorganic Chemicals

The purpose of this section is to provide language to be used in communicating with the public when an MCL for an inorganic chemical has been violated; the language is intended to inform the public about the possible health effects associated with the chemical. The proposed regulation would amend this section by revising the MCL level in subsection (h) for consistency with the proposed MCL.

Section 64468.2. Health Effects Language – Volatile Organic Chemicals

The purpose of this section is to provide language to be used in communicating with the public when an MCL for a volatile organic chemical has been violated; the language is intended to inform the public about the possible health effects associated with the chemical. The proposed regulation would amend this section by revising the MCL levels in subsections (k) and (q) for consistency with the proposed MCLs.

Section 64468.3. Health Effects Language – Synthetic Organic Chemicals

The purpose of this section is to provide language to be used in communicating with the public when an MCL for a synthetic organic chemical has been violated; the language is intended to inform the public about the possible health effects associated with the chemical. The proposed regulation would amend this section by revising the MCL levels in subsections (b), (v), and (w) for consistency with the proposed MCLs.

Procedure for Reviewing Maximum Contaminant Levels (MCLs) for Possible Revision

August 1, 1999

Objectives: Pursuant to Health and Safety Code Section 116365(g), DHS is to conduct a comprehensive review of all factors related to a possible revision of an MCL, including changes in technology or treatment techniques that permit a materially greater protection of public health or attainment of the public health goal (PHG), and any new scientific evidence that indicates that the substance may present a materially different risk to public health than was previously determined.

Criteria for selection of MCLs for comprehensive review:

Subsequent to the establishment of a PHG, the following criteria will be used to determine whether or not to select the MCL for comprehensive review.

1. Is the PHG lower than the state MCL?
2. Have there been any changes in the risk assessment since the existing MCL was promulgated, pursuant to criteria above?
3. Have there been any changes in technology making contaminant removal more feasible and/or less expensive, pursuant to criteria above?
4. If contaminant is a carcinogen, was existing MCL set at a level associated with greater than a *de minimis* (one excess case of cancer in a million people exposed for a 70-year lifetime) risk?
5. Are there any significant trends in contamination levels indicated by recent occurrence data?

Procedure for comprehensive review:

The comprehensive review includes a cost benefit analysis that, to the extent possible, reflects the incremental costs and benefits that would be accrued if the MCL were to be revised to a more stringent level between the existing MCL and down to and including the PHG. The review also includes an evaluation of the feasibility of quantification at any levels that fall below the current reporting level. The steps are as follows:

1. Obtain drinking water source and system data to use in developing benefits and costs:
 - a. All available detection data on occurrence in drinking water in California for past 4 years from WQM (Division of Drinking Water and Environmental Management [DDWEM] compliance monitoring database) and local primacy agencies (LPAs); data should be chronological by drinking water source, within system, within county, whenever possible.
 - b. For each drinking water source---type, volume of water supplied, and the population served for each of the last four years (if available); if not available, then for each system--- type and number of sources, proportion of water supplied by groundwater vs surface water, total volume of water supplied for each of past four years, and population served. (If volume of water supplied is not available, estimate using population and 150 gallons/day/person.)
2. Establish a number of possible MCL levels (review points) ranging from the PHG up to the MCL, for purposes of developing an adequate cost-benefit curve.
3. Evaluate the feasibility of quantification at any review points that fall below the current reporting level (DLR).
 - a. Discuss available methods and method detection levels with Sanitation and Radiation Laboratory (SRL); contact members of Reporting Levels Workgroup (RLW) for input on feasibility of quantification at levels below DLR.
 - b. Eliminate from further consideration any review points that SRL and RLW agree are definitely not quantifiable within $\pm 20\%$; do not eliminate those that are borderline.
4. Develop a matrix of the contaminated drinking water sources, including highest contamination data point, the number of people served, and the estimated water flow in gallons per minute; order from lowest to highest contamination data point for easy division into ranges. A range consists of any level above the lower review point up through the next highest point; e.g., if the review points were 1, 2, and 3, then the ranges would be 1.1 up through 2.5, and 2.6 up through 3.4. (in conformance with

Department policy on significant figures which requires rounding to the nearest significant figure and that the number 5 be rounded to the nearest even number).

5. Benefit determination, i.e., theoretical adverse health effects avoided. Note that this determination assumes that adverse health effects occur immediately on exceeding an MCL; this would never actually be the case, because the MCLs are always set with a significant margin of safety to ensure against that; but for purposes of this type of analysis, the MCL is used as the cutoff for immediate risk of adverse effect.
 - a. For carcinogens, determine the number of excess theoretical cancer cases avoided as a function of theoretical cancer risk, contaminant concentration, and population exposed at concentrations just above the review point up through the current MCL.
 - b. For noncarcinogens, determine the number of people exposed to the contaminant at concentrations just above the review point up through the current MCL; this number is an estimate of the number of people that would no longer be exposed to the risk of the adverse health affect.
6. Cost determination for removal treatment and additional monitoring incurred
 - a. Determine BAT to use in review
 - 1) Determine whether any new technologies for removal are available that could qualify as Best Available Technology (BAT) for review points (pursuant to Section 116370, H&S Code, requires proof of effectiveness under full-scale field applications for removing the contaminant to below the MCL, i.e., the review points in this case).
 - 2) Determine technical feasibility of using existing BAT to remove the contaminant to the level of each of the review points.
 - 3) Determine most cost effective treatment for use in estimating treatment costs (existing BAT or newly qualified BAT; a combination might also be most cost effective, e.g., one more cost effective in the lower concentration range, the other in a higher range).
 - 4) Develop/obtain cost curves to use in treatment cost estimate
 - b. Calculate incremental treatment costs
 - 1) For each source with contamination above a review point but not above the existing MCL, calculate treatment costs based on estimated source flow and contamination.
 - 2) For each review point, sum the number of sources being treated and the treatment costs to determine total incremental costs for each point; also sum incremental costs for each system and the number of systems needing treatment.
 - c. Calculate incremental monitoring costs
 - 1) If a determination was made that quantification is feasible below the current DLR to accommodate a review point below that level, to the extent possible, estimate the number of sources that would be required to do followup quarterly monitoring if the reporting level were lowered, and determine the cost per source/year, as well as the number of systems involved and the costs per system/year. Sum costs for all sources/systems that would be impacted for each review point.
 - 2) For a source with contamination above a review point but not above the existing MCL, calculate the cost of an MCL compliance determination (confirmation sample(s) + 5 additional samples within 6 months). Determine the number of sources/systems that would be required to do compliance determinations for each review point and sum the costs.

Evaluation of comprehensive review

Plot benefits versus costs for each review point. Consider the ratio of benefits to costs at each of the review points.

Response to Comments

The Department solicited written comments on the proposed regulation package R-16-01 and there were two submittals; there was no public hearing.

1. Dan Smith of the Association of California Water Agencies (ACWA); and
2. Nira Yamachika of Orange County Water District (OCWD).

The following is a summary of the comments with the Department's responses.

Commentator 1 made two comments (#1 and #5) related to the Department's basing its decisions to propose more stringent MCLs on the fact that the compliance monitoring database has few or no detections at relevant levels. Commentator 1 stated that in the future there could be proposed new water supply sources that would not be able to meet the more stringent MCLs, but that since the Department did not consider this fact as a potential cost impact to utilities, it should not factor in the increased public health benefit that would accrue should this occur. Commentator 1 also stated (#4) that the Department did not adequately review BAT to determine feasibility of treatment, citing chromium 6 as an example of one that requires different removal technologies at lower levels, and requested that the Department provide greater evidence related to the effectiveness of existing BATs for removal of the chemicals to the MCL levels in the proposed regulations.

Commentator 2 states that no comprehensive analysis of BAT with associated costs was provided for each of the chemicals and that there may be changes in treatment technologies and costs since the BATs were originally adopted. Commentator 2 requests that updated BATs and costs be provided.

Health & Safety Code Section 116365(a) states clearly that the Department is to set an MCL "...as close as possible to the corresponding public health goal placing primary emphasis on the protection of public health.." The Department is also mandated to conduct a feasibility and cost analysis. When conducting such an analysis, the Department can only work with available data, not hypothetical cases.

Further, the statute requires that the Department consider feasibility of treatment, costs, and whether the risk assessment has changed. The Best Available Technologies (BATs) already designated in regulations for the chemicals addressed in the proposal are theoretically capable of removing the chemicals to the levels of the proposed MCLs, thus meeting the technological feasibility criteria. The Department cannot offer specific evidence for such removal since none exists due to their lack of occurrence, but can cite the use of granular activated carbon (GAC) for the removal of DBCP, a common practice in the Central Valley---the GAC has removed the DBCP to the "non detect" level, using a very low detection level. Two of the regulatory BATs for cyanide (reverse osmosis and ion exchange) are also theoretically capable of removal to the non detect level.

Since existing data does not indicate that any sources will need to be treated, there is no basis for a treatment cost estimate. The Department cannot make projections

of possible future contamination without any basis for assuming that such contamination is likely to occur. Further, without actual occurrence data, there is no “cost of compliance” to develop and provide.

Finally, although the Department did note that lowering the MCLs would provide greater health protection should a detection occur, this fact was not the reason for proposing a revised MCL. The reason for the proposed MCL revisions is that the statute requires the MCL be set as close as possible to the PHG, unless feasibility and costs prohibit it. Since there appear to be no feasibility constraints and none were proffered by Commentator 1 to refute the Department’s conclusion, and costs cannot be estimated without concrete data or a basis for making data projections, the Department has no other option under the statute than to revise the existing MCL for conformance with the new risk assessment, i.e., PHG.

Commentator 1 voiced concern in comment #2 that the lower DLR for atrazine might result in the identification of contaminated sources that have not previously been identified.

The Department lowered the DLR in consultation with representative commercial laboratories that have assured the Department that detection to that level has been quite feasible for some time---in fact, many have internally used a lower reporting level than that required. Further, laboratories frequently report levels below the official DLRs, since they know that the Department is interested in the data, even though it cannot be used for compliance purposes. Hence, there is no basis for making the assumption that the lower level will result in unidentified impacts. Finally, if atrazine were a problem in California as it is in some states, the Department would certainly have seen some detections during the past four years; there have been none whatsoever.

In comments #3 and #5, Commentator 1 noted that the Department’s proposed lowering of the atrazine DLR suggested the future possibility of other DLRs being lowered and that if this should occur, there could be an impact on utilities related to the proposed revised MCLs and that the additional laboratory and transactional costs with a corresponding health benefit have not been included in the fiscal impact estimate.

The Department acknowledges that it is indeed possible that DLRs could be lowered at some future point. However, currently the Department does not anticipate lowering any other DLRs related to this regulation package and could not even begin to factor in such a hypothetical occurrence. Further, lowering a DLR does not generally result in additional laboratory and transactional costs unless there is a significant impact on the methodology or quality assurance/quality control procedures; this should not be the case with the atrazine DLR change.

Commentator 2 appears to have interpreted the statute to be directing the Department to set the MCL as close as feasible to the PHG, but NEVER AT the PHG level and is concerned about a possible conflict if an MCL is set at the PHG level. The “possible conflict” noted is that Section 116470(d) of the Health and Safety Code states that the

Department cannot require a public water system to take any action to meet a PHG. Commentator 2 also wonders what happens to PHGs once MCLs are adopted if they are at the same level.

In response, the Department makes the following points:

- 1. Many MCLs have already been set at the PHG level; as noted by Commentator 2, the PHG is a risk assessment level, while the MCL is a risk managed level incorporating feasibility. Frequently, it is possible for them to be the same, fully meeting the intent of the statute that the MCL be set as close as feasible to the PHG, the most health protective level. It was the intent of the Legislature that an MCL be set at the PHG level whenever that is feasible, since that achieves the greatest health protection.*
- 2. Since the PHG is a risk assessment number with no associated enforcement related to public water systems, it continues to exist regardless of the level of the MCL.*
- 3. Once the MCL has been set, it is enforceable; the Department uses the MCL, not the PHG for the compliance determinations; thus, there is no “possible conflict” with the statute.*

Commentator 2 expressed concern that the use of the most recent 4 years of occurrence data for the analysis could result in an understatement of occurrence.

The WQM occurrence database is voluminous; pursuant to the Procedure for Reviewing MCLs for Possible Revision attached to this Statement of Reasons, 4 years of data is considered an adequate basis for developing an occurrence analysis. The procedure was thoroughly reviewed and approved by stakeholders during its development; no one questioned the use of 4 years of data. It is always possible to miss a data point or two, but there would be no significant impact on the analysis. Further, if a source has no data because monitoring was waived, that is because the Department determined that that source was very unlikely to have contamination.

Commentator 2 also stated that DHS should provide all the details of the occurrence data used in the analysis in the public documents.

The Department reminds Commentator 2 that all this data is available at any time from the Drinking Water Program’s headquarters office, should Commentator 2 wish to review it more closely. The Department believes that it has been adequately summarized in the Statement of Reasons.

Commentator 2 states that the Department “should not assume that present day non-detections are indicative of the future, especially” since the DLRs have been lowered.

The Department is not making the assumption that there could not be any detections in the future. However, there is no basis for making the assumption that the lower DLR levels will result in unidentified impacts. Finally, if these chemicals were a problem in California as some of them are in a few other states, the Department would most likely have seen some detections above the current DLRs. Note that the Department is only required to use existing data to determine the feasibility of proposed regulations.

Commentator 2 suggests that the Department should only lower the DLR and evaluate occurrence at later date based on the reduced DLR to determine feasibility at that point related to reducing the MCL.

The Department believes that this approach is not justified in that if atrazine were a problem in California, there would certainly have been some detections given the significant number of wells and surface water sources that have been tested. Further, the reduced MCL is not lower than the existing DLR; therefore, MCL compliance is not at issue here.

Commentator 2 states that a lower DLR for atrazine could result in additional laboratory and transactional costs to water suppliers.

Based on its experience in reducing other DLRs in the past, the Department does not believe that this would be the case, particularly since there does not seem to be any problem in California with atrazine--i.e., no detections to date.